

## SCIENTIFIC JOURNALS AND ARTICLES.

*The Journal of Physical Chemistry*, December, 1899. On 'Thermal and Dynamic Coefficients,' by J. E. Trevor; 'The Electrolytic Reduction of Potassium Chlorate,' by Adolph L. Voegelé. This is a quantitative study of the reduction of potassium chlorate under various considerations of density, current strength, poles of different metals, etc. Among the conclusions reached is the greater reduction in acid solutions than in alkaline, and the greater reduction with zinc poles than with those of cadmium or platinum; 'Note on the Preparation of Metallic Lithium,' by Louis Kahlenberg; metallic lithium can be obtained without difficulty by electrolyzing a solution of lithium chlorid in pyridin, without the aid of a diaphragm. A carbon anode and iron cathode are used, fourteen volts difference of potential, and 0.2 to 0.3 ampere per 100 sq. cm. of cathode area. The metal is obtained in a dense, well-adhering, silver white coating, possessing all the well-known chemical and physical properties of metallic lithium.

A JOURNAL of Petrology is planned under the auspices of a committee appointed at the last International Congress of Geology. The journal is to have the scope of a *Centralblatt*, and it is proposed that contributions may be in English, French or German. Professor F. Becke, of the University of Vienna, is Chairman of the committee, and the American members are Professor J. P. Iddings of the University of Chicago, and Professor L. V. Pirsson of Yale University.

## SOCIETIES AND ACADEMIES.

## WISCONSIN ACADEMY OF SCIENCES, ARTS AND LETTERS.

THE thirtieth annual meeting of the Academy was held at Madison, December 28-30, 1899. The increasing number of meetings of national societies in Christmas week detracts somewhat from the attendance of members at the meetings of the Academy, but all five sessions of the present meeting were very satisfactory. The following list of papers were given and discussed:

'A study of the lead regions of Wisconsin, Illinois, and Iowa,' by Orin G. Libby.

'Household words—their etymology,' by James D. Butler.

'A problem in longevity,' by Charles H. Chandler.

'A new geometrical and analytical solution for determining the principal axes at any point of a rigid body,' by Charles S. Slichter.

'An elementary explanation of the probability curve,' by Charles S. Slichter.

'The ice ramparts formed along the shores of lakes Mendota and Monona during the winter of 1898-99,' by Ernest R. Buckley.

'The principles controlling the deposition of ores,' by Charles R. Van Hise.

'The nepheline syenite of the Wausau district,' by Samuel Weidman.

'Chlorine in natural waters—its accurate determination and significance,' by Erastus G. Smith.

'The action of light on certain nitroso compounds,' by Oswald Schreiner.

'The sour taste of acid salts and their electrolytic dissociation,' by Louis Kahlenberg.

'The historical development of chemical symbols from the times of alchemy to the present' (illustrated by lantern slides), by Oswald Schreiner.

'The absorption of the sun's energy by water,' by Edward A. Birge.

'Some of the undeveloped natural resources of Wisconsin: clays, road materials, and marls,' by Ernest R. Buckley.

'Account of some work done on the State survey,' by Dexter P. Nicholson.

'The work of the Wisconsin Geological and Natural History Survey,' Edward A. Birge.

Two additional papers were read by title: 'The Graphite Deposits of Central Wisconsin,' by G. E. Culver; 'On the Changes of Length of Substances in an Alternating Magnetic Field,' by W. M. Jolliffe.

At the one evening session a dinner was first given by the Madison members to the visiting members followed by a few speeches, including an eloquent plea by Professor Van Hise for the breadth of knowledge which the Academy aims to encourage. The company then adjourned to another room, open to the public, where the retiring President, Professor C. Dwight Marsh, of Ripon College, gave his address: The Plankton of Fresh Water Lakes. It was a well-written general discussion of the minute animal and vegetable life of our lakes, with some reference to economic features, and held the close attention of the audience to the end.

The Academy has now 225 members, and